

MEMORANDUM

TO: File

FROM: Monica Van Bussum

DATE: March 10, 2010

RE: Licensing rationale for 73-7113 (split into 73-12171 and 73-12172)

This memo serves as a record of the review and licensing of the splits of 73-7113.

Splitting 73-7113: 73-7113 was split after much discussion among our staff and consultation with the Pahsimeroi River watermaster Ted O'Neal. Well #1 on this ranch appears to have been incorrectly installed and actually takes water from the Pahsimeroi River, while the other two wells take ground water. Thus, the water right was split to allow watermaster regulation of well #1 without having to also administer the true ground water diversion from wells #2 and #3.

Contacts: Multiple assignments of permit in file making contact of record the Flying Joseph Ranch.

Source/POD/Flow Rate: For 73-12171, the POD will be well #1 with a source of ground water tributary to the Pahsimeroi River. Well #1 is the POD for 73-12171 and also 73-2159. According to the field exam, the capacity for this well is 3.50 cfs, but 3.29 cfs was used on license 73-2159. I am going to license this for 3.5 cfs but limit 73-2159 and 73-12171 to a total combined diversion rate of 3.50 cfs.

For 73-12172, the PODs will be wells #2 and #3. Well #2 was also licensed under 73-2162 for 2.49 cfs. According to the field report for 73-2162, the total flow measured was 2.49 cfs. Well #3 was previously unlicensed and, according to the 73-7113 field exam, has a theoretical capacity of 2.78 cfs. 2.49 cfs added to 2.78 cfs equals 5.27 cfs, so I will license 73-12172 with a diversion rate of 5.27 cfs. 73-12172 should be licensed limiting 73-2162 and 73-12172 to a total combined diversion rate of 5.27 cfs, the well capacity for well #2 being 2.49 cfs and well #3 being 2.78 cfs.

The astute reader will see 5.27 cfs added to 3.50 cfs equals 8.77 cfs, more than was permitted under 73-7113. Therefore, I have placed a condition limiting total flow rate for 73-12171 and 73-12172 to 7.35 cfs, the amount permitted under 73-7113.

The POD for the well in Section 20 for 73-12172 was found in the SWNE but was permitted for the NWSE. Thus, I have prepared a license amendment for 73-12172.

Annual volume: 73-7113 was not permitted with a specific annual volume limitation. The annual volume calculation for 73-12171 is as follows:

$$214 \text{ days} * 1.9835 * 3.5 \text{ cfs} = 1485.6 \text{ AFA}$$

$$425.5 \text{ ac} * \frac{3.5 \frac{\text{AF}}{\text{yr}}}{\text{ac}} = 1489.3 \text{ AFA}$$

It was brought to my attention that Application Memo #6 states the department needs to use three significant figures for rates and volumes. Thus, I licensed 73-12171 with the annual volume limit of 1490 AFA.

The annual volume calculation for 73-12172 is as follows:

$$214 \text{ days} * 1.9835 * 5.27 \text{ cfs} = 2237.0 \text{ AFA}$$

$$425.5 \text{ ac} * \frac{3.5 \frac{\text{AF}}{\text{yr}}}{\text{ac}} = 1489.3 \text{ AFA}$$

Thus, I licensed 73-12172 with the annual volume limit of 1490 AFA.

However, these individual limits do not address the intent of the permit 73-7113. If 73-7113 was left as a whole, the annual volume calculation would be:

$$214 \text{ days} * 1.9835 * 7.35 \text{ cfs} = 3119.8 \text{ AFA}$$

$$425.5 \text{ ac} * \frac{3.5 \frac{\text{AF}}{\text{yr}}}{\text{ac}} = 1489.3 \text{ AFA}$$

Thus, the two licenses 73-12171 and 73-12172 need to be licensed with a combined use limit of 1490 AFA, which would have been the limit under 73-7113.

POU: 73-7113 was permitted for 428 acres. Based on the field exam map and the available aerial imagery, I found 425.5 acres of irrigation. Because 73-7113 was split and 73-12171 and 73-12172 cover the same POU, I added a combined use limit condition for acres limiting them to a combined total of 425.5 acres.

Objections in the SRBA: There are a number of rights that have POU overlaps in the SRBA that have pending objections. However, none of those objections are POU objections and I do not foresee those objections impacting these licenses. There is an objection to POD in the case of 73-2162 but I have correspondence from Jim Speck, representing Flying Joseph Ranch, that they are dropping the POD objections to 73-2162.